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APPLICATION NO.	1	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/667,874		09/22/2003	Christoph Liebetrau	16525	1177	
50659	7590	11/14/2006		EXAM	EXAMINER	
BUTZEL I		T	KRUER,	KRUER, STEFAN		
	STONERIDGE WEST 41000 WOODWARD AVENUE				PAPER NUMBER	
BLOOMFII	ELD HILI	LS, MI 48304	3654	3654		
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Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)					
	10/667,874	LIEBETRAU ET AL.					
Office Action Summary	Examiner	Art Unit					
	Stefan Kruer	3654					
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply							
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).							
Status							
·— ·	Responsive to communication(s) filed on <u>20 September 2006</u> .						
,	, <del>.</del>						
• == • • • • • • • • • • • • • • • • •	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims							
4) Claim(s) 1 - 17 is/are pending in the application.							
4a) Of the above claim(s) is/are withdrawn from consideration.							
5) Claim(s) is/are allowed.							
	6)⊠ Claim(s) <u>1 - 17</u> is/are rejected.						
7) Claim(s) is/are objected to.	r election requirement						
8) Claim(s) are subject to restriction and/or election requirement.							
Application Papers							
9) The specification is objected to by the Examine	r.						
10)⊠ The drawing(s) filed on <u>22 September 2003</u> is/are: a)⊠ accepted or b)□ objected to by the Examiner.							
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).							
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).							
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
Priority under 35 U.S.C. § 119							
12)⊠ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a)⊠ All b)□ Some * c)□ None of:							
1. Certified copies of the priority documents have been received.							
2. Certified copies of the priority documents have been received in Application No							
3. Copies of the certified copies of the priority documents have been received in this National Stage							
application from the International Bureau (PCT Rule 17.2(a)).							
* See the attached detailed Office action for a list of the certified copies not received.							
Attachment(s)							
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 4) Interview Summary (PTO-413) Paper No(s)/Mail Date							
3) Information Disclosure Statement(s) (PTO/SB/08)  5) Notice of Informal Patent Application							
Paper No(s)/Mail Date 6) Other:							

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#### **DETAILED ACTION**

### Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1 - 3, 5 - 8, 12 and 15 are rejected under 35 U.S.C. 102(b) as being anticipated by Fromberg (5,224,570).

Re: Claims 1 – 3, Fromberg discloses a safety device comprising:

- Retaining element (3),
- An abutment (7) spaced from and fixed relative to said retaining element,
- A braking element (11) movably positioned between said retaining element and said abutment and spaced a distance from said retaining element to accept a portion (4) of a guide rail (5),
- Said braking element having a rest position spaced from the surface of said guide rail,
- A lever mechanism (20, 1, Fig. 1) connected to said braking element for moving said braking element from said rest position to a braking readiness position contacting the surface of said guide rail (at surface 13), whereby downward movement of movement of the elevator causes said braking element to be squeezed between the guide surface and said abutment,
- an operating mechanism (Col. 4, Line 59 and Col. 5, Line 13) connected to said lever mechanism for selectively moving said braking element between said rest and readiness positions (Col. 5, Line 5),
- said braking element is a blocking roller,
- said abutment is angled relative to said retaining element whereby an
  interspace (2) narrows between said retaining element and said abutment
  opposite a predetermined direction of motion of the elevator car.

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Re: Claims 5 – 8, Fromberg discloses a safety device comprising:

- a guide (9) along which the position of said braking element is changeable,
- · said guide forms an oblong recess,
- said guide is shaped to hold said braking element in said rest position,
- said operating mechanism which applies a force to his braking element for bringing said braking element into contact with said guide surface and keeping said braking element in a state of equilibrium whereby said braking element is moved automatically relative to said abutment and opposite to the direction of motion of the elevator car.

Re: Claim 12, Fromberg discloses his guide surface (one side of portion 4) is one guide surface of his guide rail (5) and said retaining element (3) is a first guiding element for guiding the elevator car alongside another guide surface (opposite side of portion 4) of the guide rail.

**Re: Claim 15**, Fromberg discloses safety device having a U-shaped configuration.

## Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 4, 9 – 11 and 16 - 18 are rejected under 35 U.S.C. 103(b) as being unpatentable in view of Fromberg over Rebillard et al (US 6,173,813).

Re: Claim 4, Fromberg does not disclose his lever mechanism swiveling about an axle, his lever mechanism being ultimately linked to a non-depicted governor or speed limiter (Col. 4, Line 59).

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Rebillard et al teach their lever mechanism (94) connected to their braking element (96) of roller form, whereby their lever mechanism swivels around an axle (100) in response to an electromechanical actuator in lieu of the non-depicted mechanical means of Fromberg.

It would have been obvious to one of ordinary skill in the art to modify the invention of Fromberg with the teaching of Rebillard et al to provide electromechanical actuation of the braking means for the benefit of integrating an emergency brake in a electronic control systems whereby sensors and/or set parameters can affect braking.

**Re: Claims 9 - 11**, Fromberg discloses his operating mechanism as a mechanical device.

Rebillard et al teach their operating mechanism having a solenoid (20) that "...exerts magnetic force... on said braking linkage..." (Col. 1, Line 58) whereby said braking element is maintained in said rest position. Furthermore, if the solenoid is deactivated, thereby extinguishing the electromagnetic force, their bolt (86) to which their lever mechanism (94) is pivotally connected, is forced by their pre-loaded spring (88) to move their braking element to a brake readiness position, whereby the braking element automatically proceeds to a full braking position in response to the opposite motion of their elevator car and the fixed position of their inclined abutment.

It would have been obvious to one of ordinary skill in the art to modify the invention of Fromberg with the teaching of Rebillard et al to provide a fail-safe mode in keeping with conventional, electromechanical control means.

**Re: Claim 16**, applicant has stated that the brake lining of the instant invention is well known to the automotive industry (Para. 54).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to utilize materials common to automotive brake linings.

Re: Claims 17 and 18, Fromberg discloses:

first leg and second legs (1a and 9), said first leg having a brake lining (3)
attached thereto and said second leg spaced from and fixed relative to said
first leg,

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 a blocking roller (11) movably positioned between said first leg and said second leg and spaced a distance from said first leg to accept a portion of a guide rail therebetween,

- said blocking roller having a brake rest position,
- a lever mechanism (20, 1, Fig. 1) connected to said braking element for moving said braking element from said rest position to a braking readiness position contacting the surface of said guide rail (at surface 13), whereby downward movement of movement of the elevator causes said braking element to be squeezed between the guide surface and said second leg,
- an operating mechanism connected to said lever mechanism for moving said blocking roller between said rest and braking readiness positions;

however, the operating mechanism does not move the braking element selectively.

Rebillard et al teach their operating mechanism (bounded by 71, Fig. 5) for movement of their braking element from the brake rest to readiness positions, in automatic response to either an over-speed or similar condition as well as by selective control.

It would have been obvious to one of ordinary skill in the art to modify the invention of Fromberg with the teaching of Rebillard et al to provide an operating mechanism providing either automatic or selective engagement of the braking element, for safety and maintenance purposes.

Re: Claim 18, Fromberg discloses said first and second leg are formed as legs of a U-shaped safety device block (Fig. 2) and an interspace (2) narrows between said second leg and said guide surface opposite the direction of motion of the elevator car.

#### Response to Arguments

Applicant's arguments with respect to **Claim 1** have been considered but are most in view of the new ground(s) of rejection.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866.217.9197 (toll-free).

SHK

3 November 2006

EILEEN D. LILLIS SUPERVISORY PATENT EXAMINER TECHNOLOGY CENTER 3600